# Hawaii Department of Agriculture - Pesticides Branch 3rd Quarter Report; EPA Region IX April – June 2015

#### **ADMINISTRATIVE:**

### Attended Out of State Travel:

- April 13 16, 2015; 2015 PREP: Senior Executive Laboratory Management Course, Savannah, Georgia. (Joey Chen, Lead Chemist)
- May 4 7, 2015; 2015 PREP Pollinator Protection & Pesticide Management Course, Portland, Oregon. (Tom Matsuda, Pesticides Program Manager)
- May 4 8, 2015; 2015 EPA National FIFRA Pesticide Analyst Workshop, Oklahoma City, Oklahoma.
   (Sean Knutson, Chemist)

#### **PROGRAM HIGHLIGHTS:**

#### Personnel:

EHS Victoria Matsumura returned to work in mid-April and interviewed for the open position as a Case Developer. She was selected and started her new position in May 2015. This opens up her enforcement position on Oahu for recruitment. This leaves just one enforcement inspector on Oahu for the time being.

Three (3) new inspector positions were granted by the Legislature during the 2014 session and the prehiring process is ongoing. These positions will be on Oahu, Kauai and Hawaii Island.

EHS Steve Russo is a participant in an Agricultural Leadership Program (ALP) conducted by the Agricultural Leadership Foundation of Hawaii. Through the ALP, participants will develop knowledge, relationships, tools and skills that will enable them to be more successful in their work and other community endeavors. EHS Christina Zimmerman previously participated in and completed the ALP program. More information about the ALP can be found at: <a href="http://agleaderhi.org/programs/alp/">http://agleaderhi.org/programs/alp/</a>

EHS Daisuke Inoyama resigned his position with the Oahu Education/Certification section in May. We are in the process of recruiting for this position.

#### **Pesticides Semi-Annual Training**

Pesticides Branch staff met in Oahu on May 20 – 21, 2015. This was the first time to hold a semi-annual meeting with staff. Topics of discussion included legislative updates on bills that were introduced in the House and Senate concerning pesticide use. (No bills made it through this session) Review of our EPA annual work plans and progress to date.

### Consulting Services.

Approval from the Governor was granted in April 2014 to develop an information technology (IT) system database within the Pesticide Branch for greater efficiency and to improve access to pesticides related information internally and to the general public. Three major sections involved are Enforcement, Registration/Licensing and Education/Certification.

Ongoing meetings continue between Datahouse Consulting, Inc., Christina Zimmerman and Steve Russo. Sometime in the next quarter, testing of the new IPIS database system utilizing enforcement inspection forms should take place as well as testing out registration licensing renewal applications.

### Online Reporting of RUP Sales - Act 105

On April 1, 2015 for the very first time, our department posted RUP sales records for all of 2014. A link to that information is provided: http://hdoa.hawaii.gov/pi/ruplist/

## Kauai Joint Fact Finding Task Force (KJFFTF)

- The KJFFTF was commissioned by the County of Kauai and partially funded by the Hawaii Dept. of Agriculture to gather and sort information and facts regarding pesticide use and its impacts. Genetically modified agricultural production on Kauai has generated many questions and debates on possible adverse health and environmental impacts.
- On April 10, 2015, inspector Ann Kam participated in an interview with other invited participants hosted by the Kauai Joint Fact Finding Task Force (KJFFTF). Questions pertained to enforcement protocol and how she investigates complaints on Kauai.
- On June 9, 2015, Pesticides Program Manager Thomas Matsuda and EHS IV Christina Bauske also participated in an interview hosted by the KJFFTF. Questions asked concerned the Waimea Canyon School incidents, complaints on Kauai over a 5 year period, and RUP Sales on Kauai.

### Development of Managed Pollinator Protection Plan (MP3)

Prior to attending the Pollinator Conference in Portland, Oregon, preliminary discussions took place between the State Apiarist (Danielle Downey) and the Pesticides Program staff on the development of such a plan for Hawaii. An assessment via Monkey Survey will be conducted next quarter with identified stakeholders. Results will help formulate Hawaii's MP3 plan.

## Registration/Licensing:

Licensing:

A total of 184 licenses were processed for this quarter (April – June 2015), with fees collected totaling \$60,720. 181 licenses were for new products, with 176 for general use and 5 for restricted use. There were only 3 licenses processed for renewals, all for general use.

### Special Local Need registrations:

None issued this quarter. 24 SLNs are active this quarter.

#### **Emergency Exemptions:**

None issued or active this quarter.

## State Experimental Use Permits:

None issued this quarter. 4 were active during this quarter.

### Groundwater Reviews/New actives status:

Fluensulfone – Preliminary review conducted as well run through of CLERS leaching model. No full groundwater required. Products may be licensed as general use.

Cyantraniliprole – (carry over from last quarter) Full groundwater review completed. All products must be licensed as restricted. HAR change.

Flupyradifurone – (Carry over from last quarter) Full groundwater review completed. All products must be licensed as restricted. HAR change.

Endangered Species Review Requests (Section 7): None requested.

### Chemical Analysis Laboratory (CAL):

- Total no. of 11 tests run for 7 samples pertaining to 3 enforcement cases were finished by both GC/MS and LC/MS equipment.
- A contract was signed to purchase a Thermo Focus Orbitrap system. The New LC-MS is expected to arrive and be installed in August.
- A toxic pesticides list was built to analyze for pesticides residue in Hawaii bees and honey.
- The Diode Array Detector (DAD) for the Agilent 1100 High Performance Liquid Chromatography (HPLC) was installed. Also a new Chemstation software for this system was installed.
- DOACAL started to order pesticide standards for the state ground water program.

## Education/Certification:

Applicator Certification and Training Work plan:

- A total of 5 statewide certification examination sessions were held.
- Thirty nine (39) examinees were tested in Private applicator or Commercial applicator categories.
- Out of these examinees, 9 individuals became newly certified applicators and another 4 individuals were re-certified in their appropriate work profession categories.
- 7 certified applicators collectively earned 36 recertification credits by taking guizzes.
- Forty-nine CET training classes were held and attended by approximately 991 certified applicators. These attendees collectively earned 855 recertification credits.

## Worker Protection Safety Program Work Plan:

- WPS training provided to:
  - Hawaiian Queen Coffee (4)
  - UofH Manoa staff (40)
  - Kaanapali Farm Services (16)
  - West Maui Irrigation Supply (4)
  - Lebebe Forestry (3)

### Other trainings/technical assistance provided by Pesticide Education staff included topics on:

- Pesticide Rules, Regulations and Label Interpretation
  - o Hawaii Ant Lab (35)
  - UH Senior's Program (60)
  - UH Manoa Students (10)
  - o ICHIO Corp. (1)
- Proper pesticide use, label review, safety, PPE, storage, recordkeeping, heat stress, calculating use rates, drift, spills
  - o Big Island Pest Control (3); recordkeeping
  - MacNut owner (1); insecticides for macadamia trees
  - o Hapuna Prince Hotel (27); landscape maintenance
  - o Thai farmers (14)
  - HDOT Airports (50)

- WPS compliance review and violations
  - o Panaewa Zoo (1)
  - UofH Dept. of Tropical Plant & Soil Sciences (2)
- IPM/pesticide safety/soil principles
  - UH Manoa students (10)
  - West Loch Fairways (1)
  - Molokai farmers (6)
- Presentation on ants in Hawaii & pesticide labels
  - o BEI Hawaii (8)
  - Homeowners (35)
- Information on insecticides, Fungicides for Bromeliads, sweet potato cuttings, mulberry plants
  - USDA –APHIS, Hawaiian Sunshine Nursery
  - o UH Dept. of Tropical Plant & Soil Sciences
  - Crop Production Services

## **Enforcement Highlights:**

### Oahu:

- In April there was a complaint filed against a farm concerning their application of pesticides to a corn field about 150 feet from the complainant's house. Swab samples were taken and are pending laboratory analysis.
- Also in April, a Special Agent from Homeland Security Investigations filed a complaint with our office concerning pesticides seen in the storage of a farm in Waianae. The president of the farm said she received the restricted use pesticide from another farmer. This second farmer said he asked yet a third farmer to buy the Epi-Mek 0.15 EC for farmer number one.
- In May, an inspection was conducted with farmer no. three who admitted to providing the Epi-Mek 0.15 EC to farmer no. one.
- In May, an inspection was conducted with a pesticide dealer because they were selling Methyl eugenol, a fruit fly attractant. This product is suspected of being unregistered. Product sampled showed that the liquid contained 94% methyl eugenol.
- In June, a complaint was filed by one farm owner against another farm owner. Complainant thinks a spray application drifted and caused damage to their 6-leaf stage corn. Samples were taken and analysis is pending.

## Maui/Molokai:

- Last quarter an agriculture use complaint involved the aerial application of glyphosate to sugar cane as a harvest aid. Five construction workers that were working on a structure about 1,000 feet away from the site of application claimed to have been exposed to pesticide drift and also detected an odor. A suspected violation of failure to add sufficient surfactant was noted in the follow up inspection with the cane company. The helicopter company had suspected violations of the spray boom exceeding the allowable length in relation to the length of the rotor and spray nozzles pointing downwards at an angle exceeding the label requirements.
- Complaint of hedge neighbor vs. goat neighbor in a gentleman estate subdivision in the Kula area of Maui. Complainant's hedge, comprised of Be-still tree plantings (Thevetia peruviana) which may be

caustic and poisonous, grows through to the other neighbor's property that has fenced goats. Goat neighbor applies glyphosate to chemically prune back hedge plants from fence and goats.

There were suspected violations of failure to wear sufficient personal protective equipment and of applying to desirable vegetation.

- In May, six individuals visited the HDOA Kahului office. Three separate complaints were filed regarding the use of glyphosate.
  - Complaint involved highway maintenance personnel applying herbicides in close proximity to a south Maui Elementary School. Glyphosate and triclopyr were the two herbicides used. Also a suspected violation of failure to keep people out of the treated area.
  - Complaint regarding herbicide spray applications to west Maui water ditch banks and easement along water ditch. Complainant claims land belong to her family. State agency produced the lease agreement for the water ditch and an easement along the ditch.
  - Complaint involved highway maintenance personnel applying herbicides along Hana highway in the Haiku area of Maui. Glyphosate and triclopyr were the two herbicides used. Complainant stated that her Rottweiler dog developed skin problems from contacting the sprayed vegetation.

#### Kauai:

- One complaint was filed on behalf of a Canadian Tourist by the Kauai Council Chair. Complainant claimed that while walking thru Smith's Tropical Paradise, she read a sign that stated that every Thursday evening, at 10PM, DDT was sprayed on the roses in the rose garden. Smith's Tropical Paradise said they do not spray pesticides but the day that the guest complained, some Malathion was applied. The last of the pesticide was used and the bottle was thrown away. Upon further review of the garden signs, it was discovered that although DDT was printed in the literature, this citation was from outdated information to treat for rose beetles.
- A second complaint was filed by a retired EPA agent regarding pesticides being sprayed at
  Princeville Golf Course. Concerns are that the pesticides are entering the streams and rivers and
  ending up in the ocean and killing the reefs. Native geese, Nene, are also present and the
  community has concerns that applications will poison the geese. Water, soil and vegetative
  samples were collected and are being analyzed. Wildlife Management team with DLNR were also
  alerted to the communities concerns. There have been no reported death of Nene in Princeville to
  date.
- A third complaint involved a neighbor vs. neighbor complaint. An application of Roundup and Pendelum by one of the neighbors created a bad odor and call to HDOA. The applicator provided all information of the application and was informed that site was not on the label and rate of application was too high.
- A fourth complaint involved an application of beige pellets in a yard in Koloa. The complainants believe their neighbor, threw pellets into their yard by their banana trees. The pellets were sent to the CAL for analysis.
- A fifth complaint was filed by a man claiming that his neighbor's application of Roundup has killed his long beans and lima beans and has made his wife very sick. Two dead lima bean seedlings were collected and swab samples were collected from the screens of the home. I asked the man to point in the direction of the neighbor that had sprayed. All the trees and ground cover in that direction were green. The neighbor said he did not spray anything in the past 6 months. Another neighbor that was located closer to the complainant's house was inspected for his Roundup application. The complainant was upset because he did not want to file a complaint against this neighbor.

#### Hawaii Island:

- In April 2015, the enforcement inspector was notified that a Big Island resident has ingested glyphosate in a suicide attempt and was taken to the Kona Community Hospital emergency room where he expired. Kona Police had obtained the pesticide container from which a concentrate sample was obtained. Lab analysis results indicated Glyphosate 49.3%.
- In a follow up to a newspaper article stating "Pesticides Sickens Students at Holualoa elementary School, school officials reported of a noxious odor on campus. The responding HAZMAT team located the source of the noxious odor and asked the farmer to stop spraying. Once the spraying stopped the odor dissipated and the HAZMAT team reported that the air quality was not a health hazard and school officials did not evacuate he school. The applicator confirmed that Botanigard was applied. Applicator signed attestation that in the future he will not spray when school is in session.
- A photograph of a County of Hawaii Highway Division employee spraying into the Alenio flood channel in Hilo, Hawaii was forwarded to our branch by the Department of Health. The photographer believed that the photograph was taken on May 13, 2015. The County of Hawaii Highways Division spokesperson stated that they must maintain a weed free flood channel for annual Federal Inspection. In the future the applicator will walk and pull hose closer to site of application, and a reduced pressure and increased droplet size to be used. Aquamaster was applied weeds within the flood channel. County staff commented that the application was made in 2014. E-mails to the photographer to confirm this date of application were not responded to.
- A Kurtistown resident called stating that her dog had died of suspected pesticide poisoning. The resident had obtained the stomach contents of the dead dog. Lab results are pending. An unknown person was observed outside of the resident's fence line along the roadside at 12:30 am with a flashlight.
- A pesticide poisoning report from a mobile Veterinary service in Hilo, Hawaii was received. The D.V.M reported to the Pesticides Branch of a suspected dog poisoning. Tests were not conducted to determine the causative agent. The dog owner who permitted the dog to roam would not return calls to the enforcement inspector.
- A Kona resident filed a complaint against pesticide usage around historical sites at Hokulia
  Development in Kailua-Kona. This resident was the organizer of a public protest against Hokulia. A
  local newspaper article claimed this resident's son and others developed rashes on their skin after
  walking thru weeds treated at a burial site. After meeting with the resident, she stated that the
  article was a publicity stunt. Ranger Pro was being applied according to label direction.
- Two spray drift incidents were reported related to State Highway crews applying herbicide during windy conditions along Highways 11 and 19. Crews will carry wind gauges and curtail applications if wind speeds exceed 9 mph.
- A former Mayor on the Big Island passed on information regarding dead and dying ducks at Wailoa River State Park in Hilo. A resident of the Waiakea Villas had observed employees spraying around the buildings and was concerned that it may have affected the ducks. Field surveillance was conducted in the area and 12 dead/dying ducks were discovered. DLNR personnel were called to assist with collecting specimens. Dead ducks are being tested by USGS. Live ducks were taken to a local vet, and are recovering. The deaths have not slowed down/stopped. DLNR suspects Avian Botulism since it has been very hot in Hilo. A follow-up inspection with the spraying applicator will be conducted.

## **Special Projects:**

### IPM In Schools:

- No meetings with DOE facilities this period.
- Development of IPM informational booklet for local public schools Grades 1 5:
  - No further work done on this project. The draft text of the IPM Project was completed and cartooning work needs to be implemented.
- Development of Crop Grouping for mobile app:
  - o Will probably develop into a reference for field staff.
  - Steve Russo, as part of his ALP project will be developing a format that list commonly produced crops by immigrant farmers. These crops will be identified through photographs and translation of names from their native tongue to English. Work to finalize this product will be out sourced.
- Development of WPS Handler and Worker narrated slideshow:
  - No further work done on this project. Due to a shortage in manpower in the Oahu
     Education/Certification section, Steve Russo has been performing the duties of 2 people.